Map shows arsenic pollution in five more Portland neighborhoods



By Rob Davis | The Oregonian/OregonLive

Email the author | Follow on Twitter

on February 11, 2016 at 1:55 PM, updated February 18, 2016 at 9:01 AM

As an angry crowd of more than 750 people watched Tuesday night, state and federal officials for the first time unveiled maps that showed where they'd found alarming levels of carcinogenic metals in tree moss around Portland.

The raucous community meeting focused on maps showing two places where high cadmium levels were found near stained glass manufacturers. Health and environmental officials on stage gave little attention to one map that flashed by briefly on a projector screen.

It raised questions that still haven't been answered.

The map showed many more concentrated areas in the city where federal researchers had found elevated levels of arsenic in tree moss than previously disclosed. While attention and community outrage have so far focused on the cadmium hot spots, this map indicated a far more widespread problem.

In addition to the known cadmium hotspots in Southeast Portland near Cleveland High School and in North Portland near the Fremont Bridge, the map showed five other hot spots for arsenic. The carcinogenic metal is used in glassmaking, semiconductor manufacturing and other industries.

The Forest Service, which produced the map, said glass manufacturers were located near two:

- · Interstate 205 and Sandy Boulevard.
- Columbia Boulevard and NE 60th Avenue.

No specific businesses have been identified as potential sources near the other three areas of arsenic concentration:

- Southeast Flavel Street and SE 57th Avenue.
- · Sandy Boulevard and NE 52nd Avenue.
- N. Marine Drive near Interstate 5.

Although the Oregon Department of Environmental Quality has had the map for months, the agency has not announced a plan to investigate the sites. The state agency released the map Wednesday to The Oregonian/OregonLive.

Forest Service spokeswoman Yasmeen Sands declined a request to speak with the scientists who created the map, instead referring questions to the Department of Environmental Quality, which didn't respond to detailed questions about it.

Linda George, an atmospheric chemist at Portland State University who has studied the city's air pollution, said areas with high levels of arsenic in tree moss should be investigated.

"The moss maps are very useful in identifying potential hotspots for metal deposition," George said. "However, we don't know the limitations of connecting metals accumulated in moss with atmospheric levels. Atmospheric monitoring is very expensive so it is very helpful to have a way to target efforts."

The Department of Environmental Quality, the state's top environmental regulator, has focused on the largest hot spot, at SE 22nd Avenue and Powell Boulevard in Southeast Portland. Officials monitored the air nearby in October, getting test results Jan. 20 that showed arsenic at levels 159 times above the state's safety goal. Cadmium levels were 49 times higher, increasing residents' lifetime chances of getting cancer if they breathed the same polluted air every day.

The agency said it believed a Southeast Portland glass manufacturer, Bullseye Glass, was responsible. The company immediately announced it was voluntarily suspending use of arsenic and cadmium.

PORTLAND'S TOXIC AIR

The 'green' city of Portland, Bullseye Glass and toxic air: Letters to the Editor

Portland's toxic air: What you need to know, Feb. 27

Watch: A look inside Bullseye Glass, company at center of Portland toxic air alarm

State didn't tell Portland schools about 'alarmingly high' soil reading at Cleveland

Emails reveal state's timeline on air toxics response is wrong

All Stories

While the agency has known since May about other areas with high concentrations of arsenic and cadmium, it has so far failed to articulate a strategy for surveying them. Nearly a month has passed since state air testing confirmed that moss could predict pollution sources. But the state still has not said what it will do with that knowledge.

The agency is under pressure from Oregon Gov. Kate Brown to come up with answers. In a Tuesday letter, Brown gave the Department of Environmental Quality and Oregon Health Authority a Friday deadline to explain its next steps and say how it will notify the public about the risks.

An agency air quality official, David Monro, told the Tuesday night crowd an air monitor would be deployed near a northern Portland cadmium hotspot within days or weeks — "not months," he said. Monro's agency has said it believes that hot spot is connected to another nearby stained glass studio, Uroboros Glass, which has also voluntarily suspended using cadmium. The company said it doesn't use arsenic.

That leaves the five previously undisclosed locations, where moss showed high concentrations of arsenic that have gone unexamined.

State regulators have known for at least decade that Portland's air contained unsafe levels of arsenic citywide. Advocates say the Department of Environmental Quality has been complacent in investigating the cause. The state has known for years that Portland's air was dirty but has made little progress in cleaning it up.

Mary Peveto, president of Neighbors for Clean Air, a Northwest Portland nonprofit, said she was alarmed by the arsenic map.

"I feel for every one of those families and kids who are living in those spots," she said.

With growing pressure on the Department of Environmental Quality and its top leaders, Peveto said she had little faith in the agency, a message she said she plans to deliver to the governor.

"The whole thing has to be taken apart and rebuilt," Peveto said.

- Rob Davis

rdavis@oregonian.com

503.294.7657

@robwdavis

Registration on or use of this site constitutes acceptance of our User Agreement and Privacy Policy

© 2016 Oregon Live LLC. All rights reserved (About Us).

The material on this site may not be reproduced, distributed, transmitted, cached or otherwise used, except with the prior written permission of Oregon Live LLC.

Community Rules apply to all content you upload or otherwise submit to this site. Contact interactivity management.

▶ Ad Choices